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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/510,442	10/07/2004	Claudio Verneti	69179-230013	2146

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EXAMINER

GONZALEZ, LUIS A

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3653

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/510,442	Applicant(s) VERNETTI ET AL.	
	Examiner Luis A. Gonzalez	Art Unit 3653	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 18 October 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) 7, 14, 17 and 24 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-6, 8-10, 12, 15, 16, 18, 19, 22, 23 and 25 is/are rejected.
- 7) ☒ Claim(s) 11, 13, 20 and 21 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 07 October 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

The indicated allowability of claims 5-9, 11,13, 15, 17, 20, 21, 24, 25 are withdrawn in view of the different references of Hamamoto et al. US 6,650,436 in view of Lim et al. US 6,446,954, and further in view of Nakajima JP 58131084. The examiner regrets any inconvenience to applicant.

Amendments

The amendments to the claims, drawings, and specifications have been entered into the record.

Response to Arguments

1. Applicant's arguments with respect to the rejection(s) of claim(s) 4, 19, 22, and 23 under 35 U.S.C. 102 and claims 1-3, 16 and 18 under 35 U.S.C. 103 have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of Hamamoto et al. US 6,650,436 in view of Lim et al. US 6,446,954, and further in view of Nakajima JP 58131084.

Claim Objections

2. Claim 1 is objected to because of the following informalities: In line 13 of claim 1, where it reads. "a changeover mechanism arranged downstream of said motor..." should be corrected with "...downstream of said paper feeding motor", not to be confused with the "one motor roller".

Appropriate correction is required.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claim 1, 4, 5, 10, 18, 19, and 23 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 1 recites the limitation "the picking motor" in line 8. There is insufficient antecedent basis for this limitation in the claim. For examination purposes, "the picking motor" is interpreted as the picking roller. Correction is required.

Also, in claims 1, 4, 5, 18, 19 and 23, it is unclear to the examiner what is meant by the limitation of "high resolution". The limitation "high resolution" is not clearly defined in the specification. "High resolution" does not necessarily limit the roller to a given speed. As best understood by the examiner, "high resolution" movement is taken to be "low speed". Clarification and correction is required.

Claim 10 recites the limitation "further comprising a blocking group" but it's unclear to the examiner how the "blocking group" relates to the various elements indicated in claim 1 and the function performed by the blocking group. Correction is required.

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

6. Claims 23 and 25 are rejected under 35 U.S.C. 102(b) as being anticipated by Pittelkow et al. US 5,676,365.

Pittelkow et al. discloses a feed device comprising:

- a paper feeding motor (26) including a pinion (24);
- a kinematic linkage comprising a worm screw (15) and a helical wheel (14);
- a support (16);
- an intermediate tooth wheel (23) meshing with the pinion.
- a friction means (21) having an anti-vibration function in the meshing between the worm screw and the helical wheel.

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claim 1-4, 6-10, 12, 15, 16, and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hamamoto et al. US 6,650,436 in view of Lim et al. US 6,446,954, and further in view of Nakajima JP 58131084 A.

Hamamoto et al. teaches a paper feeding device (FIG. 5A) for an ink jet printer and the paper feeding device comprising:

- a paper feeding motor (34);

- a picking mechanism including a picking roller (32) motorized by the paper feeding motor, the picking roller adapted to pick a sheet from a stack and move the paper in a picking direction along a picking path;
- at least one motor roller (165) located downstream of the picking roller along the picking direction, and motorized by the paper feeding motor, the motor roller adapted to move the sheet through the printer in a printing direction consistent with the picking direction;
- a changeover mechanism arranged downstream of the paper feeding motor including an actuating member (167) being servo dependent on the direction of rotation of the paper feeding motor;
- a blocking group, having storing elements (145, 146), and a control group (141), a carriage (41) for a print head (37b) that is servo dependent on the carriage for re-establishing servo control of the actuating member when the carriage is a working position external to the printing area.
- a cleaning station (45) in an end of stroke position , and the working position being adjacent to the cleaning position.
- wherein activation of the blocking group causes inversion of the direction of motion of the paper feeding motor.
- Regarding claim 15, a stopper member (145,146) and a removing element (41).
- a clutch (140) suitable for being connected with the paper feeding motor.

Hamamoto et al. does not teach 1) wherein the motor roller is adapted to retract the sheet in a retraction direction opposite the picking direction along an alternative path to the picking path; 2) wherein the changeover mechanism is adapted to operate the motor roller to move the sheet at high speed during the movement in the retraction direction, and 3) to move the sheet at high resolution during the movement of the paper in the printing direction.

Lim et al. teaches a feeding apparatus that comprises a motor (not shown) to drive both a pick roller (4) and a motor roller (6). The motor roller is adapted to retract the sheet (14) in a retraction direction (R) opposite the picking direction along an alternative path (as demonstrated by the curved shape of the sheet) to the picking path for sheet registration. The motor roller is further adapted to move the sheet in the scanning direction to position the sheet for scanning. Therefore, it would have been obvious to one of ordinary skill in the art, at the time the invention was made to modify Hamamoto's device to include the retraction of the sheet by the motor roller in order to align the sheet prior to conveyance to the recording device.

Nakajima et al. teaches a printer that comprises a single motor and a changeover mechanism that feeds paper at high speed initially, then stops then slows down prior to printing , then is ejected at high speed. The changeover mechanism (not shown) is the controller that operates the change in speed of the movement of the paper. The ability to alter the speed from high speed to low speed (during printing) then back to high speed (during ejection), provides a printer that operates at high speed while not sacrificing quality of the recorded image. The overall speed of paper feeding is

improved. Therefore, it would have been obvious to one of ordinary skill in the art, at the time the invention was made to modify Hamamoto's device to include the changeover mechanism as taught by Nakajima in order to provide a printer with the ability to convey at high speeds with great quality images.

Allowable Subject Matter

9. Claim 11, 13, 20 and 21 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Luis A. Gonzalez whose telephone number is (571) 270-3094. The examiner can normally be reached on Mon-Fri, 8:30AM-6:30PM, Alt. Friday off, EST..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick Mackey can be reached on (571) 272-6916. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.


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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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